

# *The* Management REVIEW



**APRIL, 1941**

---

**COMMENT • DIGEST • REVIEW**

---

## **THE AMERICAN MANAGEMENT ASSOCIATION**

The American Management Association is composed of industrial and commercial companies and executives interested in modern management. The AMA makes no profit, does no lobbying, and advances no propaganda. Its interests are solely the solution of current business problems.

### **Organization and Operation**

The AMA serves its members through seven divisions: Office Management, Personnel, Production, Marketing, Finance, Insurance, and Packaging. Each of these divisions is headed and directed by a man drafted from industry.

### **Conferences**

Each of the seven AMA divisions holds at least one annual conference, where problems of timely importance in its field are discussed. Printed conference proceedings go to members of the divisions concerned.

### **Information and Research**

The AMA Information and Research Department places at the command of every member company a trained research staff on management problems. In addition, the AMA maintains a modern, up-to-date library of management books and business publications.

### **AMA Periodicals**

THE MANAGEMENT REVIEW (monthly) contains digests of articles on management appearing in over 400 publications, and brief reviews of current business books. It enables a busy man to survey all current topics of interest to him in less than 30 minutes. PERSONNEL (quarterly) publishes articles on employee selection, training, compensation, and the like. BUSINESS CONDITIONS AND FORECASTS (monthly) gives a summarized analysis of the statements of six of the foremost business services.

**Editor — JAMES O. RICE, 330 West 42nd Street, New York, New York**  
**Assistant Editor — M. J. DOOHER**

THE MANAGEMENT REVIEW is published monthly by the American Management Association at 330 West 42nd Street, New York, N. Y., at fifty cents per copy or five dollars per year. Vol. XXX, No. 4, April, 1941. Entered as second-class matter March 26, 1925, at the Post Office at New York, N. Y., under the Act of March 3, 1879.

The object of the publications of the American Management Association is to place before the members ideas which it is hoped may prove interesting and informative, but the Association does not stand sponsor for views expressed by authors in articles issued in or as its publications.

# CONTENTS

APRIL, 1941

Volume XXX

No. 4

Copyright, 1941

American Management Association

Printed in U. S. A.

## The Management REVIEW

### The Management Index

The Cost of Economic Isolation.....	118
<i>Barron's</i>	
Money-Saving Ideas for the Office.....	121
<i>The Controller</i>	
Paid Vacations for Hourly Workers.....	123
<i>American Business</i>	
Telling the Employees.....	124
<i>The Public Opinion Quarterly</i>	
Rehabilitation of Disabled Employees.....	127
<i>Industrial Medicine</i>	
Hours of Work in Wartime.....	131
<i>Industry Illustrated</i>	
How One Manufacturer Speeds	
Defense .....	133
<i>National Defense</i>	
Wanted: More Logic in Hiring	
Salesmen .....	136
<i>Sales Management</i>	
Cutting Costs on Salesmen's	
Automobiles .....	140
<i>Dartnell News Letter</i>	
And Others	
The Management Question Box.....	147
Survey of Books for Executives	
Design for Industrial Co-ordination.....	150
<i>Reviewed by Martin Miller</i>	
Internal Auditing: Its Nature and	
Function and Methods of Pro-	
cedure .....	151
<i>Reviewed by Jules I. Bogen</i>	
Business Cycles: Their Nature, Cause	
and Control .....	152
<i>Reviewed by Elmer C. Bratt</i>	
Industrial Conflict: A Psychological	
Interpretation .....	154
<i>Reviewed by Albert D. Freiberg</i>	
And Others	

April, 1941

**H**AVE you a "gadfly" customer? It's one of the latest ideas for better management. He is the customer who is never pleased. Every order he sends is a headache; even though you try your best, getting a compliment from him is as impossible as getting a laugh from the Sphinx. He grumbles, he growls, he sneers, he yowls. The goods were damaged, he says, the billing was wrong, the delivery was late, etc., etc. But the gadfly customer, like Guinness' Stout, is good for you. He keeps you on your toes. Other customers give you the praise he withholds. Your competitors consider you superhuman. More about the merits of the gadfly on page 141 (The Profit in Unreasonableness).

**I**T'S an ill wind that doesn't blow an advertising or a sales organization some good. War preparedness brought about our Selective Service Law, and the Selective Service Law has created a market—a booming market of 1,000,000 hale young customers with a minimum stipend of \$21 a month. The trainee buys cigarettes, soda pop, shoe polish, and saddle soap. He sends souvenirs to his ma and to his girl friend. It is estimated that, of his \$21 a month, the trainee spends \$7 on such goods as have been mentioned—most of it at one of the Army's Post Exchanges. In all, the military trainee market represents a sales potential of \$84,000,000—and it's still growing. See page 135 (Selling Your Goods to Soldiers).

**M**OST interesting story of the month describes how one company helps sick and disabled men to get back to work (Rehabilitation of Disabled Employees). There was once a day in industry when the disabled employee was his own problem and nobody else's. Today industry tries to help him, and it has been found that not only are the recuperative powers of the individual stimulated when he feels he is being useful, but he discovers many skills and abilities which he never imagined he possessed. Read on page 127 about the experience of the Baton Rouge Refinery of the Standard Oil Company of Louisiana in this work.

117

---

# THE MANAGEMENT INDEX

---

## *General Management*

### The Cost of Economic Isolation

**I**N THE past few years, industrial goods, particularly manufactured goods, have become our principal type of exports. They have dethroned farm products and now constitute our most vital stake in foreign markets. In the case of an Axis victory, we might lose the greater part of our export outlets for industrial goods.

Determination of the cost to American industry of enforced isolation from world markets involves a number of factors. It is important, of course, to know the volume of total exports of industrial goods. More important, however, is their significance to our entire domestic economy and to separate parts of it. For instance, exports of false teeth, at \$1,500,000, represent more than one-fifth of the output of this industry. Exports of paraffin wax of approximately \$8,000,000 represent almost 50 per cent of total output. Obviously, the loss of foreign demand would seriously affect these particular industries, but it would certainly not upset industry as a whole.

In relatively normal times our exports of both manufactured goods and the raw materials of mines and forests amount to only about 6 per cent of total demand for them. In the long run, therefore, it would appear likely that even the complete loss of our export markets for these products would not permanently cause serious economic maladjustments. This is not to say, of course, that the short-term effects would not be disrupting, or that certain industries would not be permanently injured.

By far the most important manufactured products exported are machinery, automobiles, iron and steel products, and petroleum products. Because these industries are so important, the loss of their export markets would affect the whole industrial picture. But would the loss be large enough seriously to affect domestic business?

The four groups—machinery, automobiles, refined petroleum products, and iron and steel mill products—have in normal times accounted for an ex-

For publishers' addresses or information regarding articles or books, apply to AMA headquarters.



X  
port demand of \$1,300,000,000 to \$1,400,000,000, representing about 60 per cent of the total export demand for manufactured goods. The loss of this business would certainly be felt in the domestic economic picture. The petroleum refining industry particularly would be hard hit, since its loss would amount to 12 per cent of total demand.

Export demand for automobiles has been about 10 per cent of the total demand for automobiles in recent years. Loss of the export market for trucks would be especially serious, since exports constitute 20 per cent of total truck production. Because of the resulting unemployment and reduced payrolls in this industry, total business activity would suffer.

Fortunately, however, these major industries which would be hardest hit by a loss of export demand have shown considerable growth in domestic demand in the past few years. The loss of export demand could be made up by increased domestic demand within a short period of time, perhaps in two to three years.

Analysis of the export situation for raw materials of mines and forests indicates that the export demand is such a small proportion (about 6 per cent) of the total demand that the loss of exports would not seriously affect the domestic economy.

It should be noted that these classifications of exports lead to some understatement of the total exports of certain products. This is due to the fact that additional quantities of certain goods are included in other products

at a more advanced stage of production.

Steel is a good example. The automobile industry uses about 20 per cent of the total steel that is produced. Thus, the loss of the export market for automobiles (amounting to about 10 per cent of the total demand for cars) would reduce the amount of steel going into cars by about 10 per cent and would therefore reduce the domestic demand for steel about 2 per cent on this account.

The same conditions apply to other raw materials, such as petroleum, and to semi-manufactured products, particularly those durable products that are used in the manufacture of finished durable goods.

On the basis of census data showing the importance of raw materials in the cost of manufactured goods, a decline of 6 per cent in manufactured goods production (due to the loss of export sales of these goods) would lead to approximately a  $2\frac{1}{2}$  per cent decline in the domestic demand for raw materials. However, this does not affect the conclusions concerning exports of manufactured products as a group.

The salient point revealed by this analysis is the fact that the export demand for both manufactured goods and for raw materials of mines and forests is only about one-sixteenth of total demand. Thus a very small increase in domestic demand would more than offset the loss of the entire foreign demand. BY LYMAN S. LOGAN and G. OGDEN TRENCHARD. *Barron's*, March 24, 1941, p. 8:2.

# Office Management

## Self-Maintenance of Office Equipment

THE Prudential Insurance Company of America has its own office-machine maintenance department. It consists of 11 mechanics, one foreman, one parts-stock inventory man, and a service desk for the receipt of all calls, with two clerks who also handle machine records.

This group services approximately 2,412 of the larger office machines—i.e., adding and bookkeeping machines, phonographs, calculators, and miscellaneous items such as stamping machines, postage meters, automatic typewriters, etc. This excludes regular typewriters and such small items as numbering machines, pencil sharpeners, etc. Records over the past eight years show the following annual percentages of activities for the group: 44 per cent, actual repairs; 21 per cent, inspection; 7 per cent, overhauls; 18 per cent, special work; 10 per cent, non-productive, vacations, sickness, etc.

The Prudential believes that an efficiently run maintenance shop can and does pay for itself. The company's first requisite is careful selection of the mechanics, fully-trained men of adequate experience, for the major machines. Within each of the various groups there is flexibility which permits of adequate repair coverage, special assignments, sickness, and vacations. The service desk maintains contact with

each mechanic when out on a call; thus, there is a minimum of time lost in answering another call. The time for answering calls ranges from 10 to 30 minutes.

The service desk files an individual repair slip for each machine. From these records a whole year's work can be predetermined and scheduled. An annual survey is made of machines within certain age classifications. This results in a weeding-out of equipment not up to standard, and permits the transfer of equipment that is still usable to departments where 100 per cent use and efficiency are not required.

Other services provided by this department are: ribbon replacements (extra on service contract); checking of form work to machine operation; temporary setups or adapting of machines to changes of work; intelligent instructions to machine operators, in collaboration with the Personnel Department; expert technical advice on departmental machine problems; examination of new products.

According to Prudential records, owner service has a 35 per cent time advantage over service contract, and is less expensive.

BY JOHN H. BOSTOCK. *N.O.M.A. Proceedings: 1940, p. 78:2.*

## Money-Saving Ideas for the Office

**E**CONOMIES in office operation are of three distinct types, comparable to certain classifications on a company's balance sheet. The first covers immediate money savings, comparing with the balance-sheet item, cash: ideas that can be put to work immediately. The second may be compared with "receivables": ideas which require constant effort in order to realize any return. The third compares with "investments": long-range money-saving ideas.

Most of the opportunities for economy in the first classification will be found in stationery supplies. A periodic review and constant attention to forms and their use will not only save dimes in stationery expense but dollars in payroll. A form costs only a few pennies, compared with the dollars it takes to prepare and use it; hence enthusiasm for economy in printing should not be allowed to overrule economy of operation.

Standardization of forms can produce savings close to 10 per cent. By printing in "gang" runs, still another 30 per cent can be saved. The next step is a logical outgrowth—the signing of a mutually beneficial contract with a local printer. All costs are predetermined except that of paper, which is based on market price; and prices can be computed as easily by the purchaser as by the printer.

Other savings may be effected by packaging your own brands of supplies, carbon paper, typewriter ribbons, and

the like. One organization saved from 30 to 45 per cent per gross by contract purchasing of wood pencils. Another company saves pencil stubs discarded for office use and supplies them to its plant men. (The plant men did not like to carry long pencils, and broke them in two anyway.) Numerous concerns have achieved interesting results with mechanical pencils; while opinions are not unanimous, many of the experiments have been so encouraging that use of such pencils should be investigated by more concerns.

In the purchase of mechanical equipment, there is a tendency to assume that anything that can be done mechanically is done *best* mechanically. In some instances, nevertheless, it will be found that hand methods excel any machine for fundamental requirements. In one company, a controller purchased a \$500 calculator for two men in his department. Before long, both men were up in arms. It seemed that both needed the calculator at the same time. A plant engineer suggested that perhaps two slide rules would better serve the purpose. A more thorough analysis of the job was made, and the slide rules were purchased, solving the problem satisfactorily. The calculator was placed at another location.

Office gadgets include small money-saving devices worked out for specific jobs. For instance, when desks are back to back, or end to end, and two persons need the same equipment on a part-time basis, the use of a turntable will prove

economical. In one company a turntable which made a dictating-machine available to two men was built at a total cost of \$16, dispensing with the purchase of a \$200 machine.

The second classification of economies — intermediate money-saving ideas requiring constant application— covers the sort of work that systems men, methods and planning departments, or management councils perform. Even when efficient methods are employed, many unnecessary checks and double checks or temporary requirements can be added to procedures unless supervisors audit them regularly to preserve their original effectiveness.

One company, after investigating a sales analysis routine, decided to replace tabulating equipment with hand-driven calculators; an estimated annual saving of \$25,000 resulted. Another concern replaced billing-machine equipment with tabulating equipment on an order-invoicing routine and saved \$15,000 annually.

The third phase of the economy pro-

gram—long-range money-saving ideas—requires the cooperation of every employee. No one individual, no group or committee, can effect savings continually without the support of the individuals in the organization. One way to gain employee support is through a well-administered suggestion system. Waste-prevention programs are another long-range method of saving money. Another step is employee training. Company attitude is an important factor. In many offices there seems to be an absence of desire to experiment, or a lack of facilities for experimentation. One company has refused to effect a change that would save \$200 monthly because it might involve an error possibly as high as \$5 per month. There is little point in striving for absolute accuracy regardless of cost.

Management's policy should be to compliment on savings rather than reprimand for spending. It should teach thrift instead of demanding economy. By R. SHULL. *The Controller*, January, 1941, p. 32:5.

### *Speed-Up in Billing*

**B**Y changing operators of the Burroughs electric billing machine every 2½ hours, the Pelican Well Tool and Supply Company, of Shreveport, La., has found that as much billing is done in five hours by two girls as was done by one girl in a whole 7½-hour day without relief. The plan has been in successful operation for almost three years. The operators' performances are recorded by keystroke counter. Each girl reads the keystroke register at the beginning and end of her shift and turns in the figures on a printed slip to the supervisor.

Not only has this plan increased production in the writing of customers' invoices, but because it requires several operators to keep the machine in operation all day a backlog of trained billing-machine operators is built up.

After a girl's shift on the billing machine is finished, she does related work, such as computing extensions, reconciling charge sheets with customers' purchase orders, filing copies of invoices, etc.—all of which keeps her busy for the two-thirds of the day she is not billing. The operators themselves like the shift plan much better than the usual 7½- or 8-hour drudge at a single repetitive task.

—American Business 3/41

## Personnel

### Paid Vacations for Hourly Workers

ONE of the developments indicated by the *American Business* 1940 salary survey is the increasing number of companies giving all employees, hourly-paid and salaried, vacations with pay. Ten years ago very few plant employees receiving wages on an hourly or piecework basis ever got time off with pay, but last year 56 per cent of the companies reporting said that all employees are given vacations with pay.

Thirty-one per cent of all the companies cooperating in this survey said that they give the same vacations to factory workers as to office employees, without any discrimination as to length-of-service requirements. Twenty-five per cent of the companies reported they give factory workers vacations of some kind, but not on the same basis as office workers—either factory employees receive less time for the same service record, or they need more service to get a comparable length of time off.

In some firms the only factory employees who are eligible for vacations with pay are salaried employees such as superintendents, foremen, clerks and foreladies. In such cases—slightly more than 8 per cent—these employees enjoy the same vacation privileges as office employees.

A little less than half the companies giving factory employees vacations, but

with different requirements for eligibility—44.6 per cent—give one week's vacation after one year's service. Twelve per cent give a week's vacation after six months' service, 9 per cent after five years' work, and a few companies require different service records, such as two, three, six, seven, and ten years. Thirty-two per cent of the companies reporting different policies for factory and office employees give factory employees vacations of two weeks. Of them, one-third require five years' service, one-third ten years' service, and others demand such periods as one year, two, three, seven, and 12 years.

In contrast to this, 50 per cent of the business organizations which make no discrimination in vacation policies between office and factory employees allow all employees one week's vacation at the end of six months' time with the company, and two weeks' vacation after completion of one year's service. One year is required by 41.4 per cent of the companies in this group before a one-week vacation is granted, and 23 per cent give two-week vacations to employees of two years' standing.

Eighty-two per cent of the companies cooperating in this survey use staggered vacations, both for office and factory employees. Of the remainder, 7 per cent close down both office and shop for the specified vacation time, and 10 per cent use staggered vacations for office employees and close down their



shops so that all factory employees vacation at the same time. It is of interest to note that every company which closes down either the shop alone or the whole organization does it some time during the month of July, and most of them in the first half of the month.

For companies which stagger their vacations, the periods in which employees may take their vacations varied greatly, but 98 per cent included the summer months, June, July and Au-

gust, in their vacation periods. Twenty-seven per cent of these companies simply said "summer," and 18 per cent named these three summer months specifically. Only 13.7 per cent said that their employees could take vacations any time, thus making possible winter vacations. Other periods most frequently named were: May to October, June to October, April to September, and May to September. *American Business*, March, 1941, p. 17:3.

## Telling the Employees

**A**NNUAL reports to stockholders have been regarded as of primary value in the important job of stockholder education. Coupled with sound employee policies, there would seem no reason why similar reports specially prepared cannot serve equally well in building understanding and good will among jobholders.

Yet an investigation of several hundred corporations throughout the country reveals that this elementary approach to the problem of employee education has been almost wholly overlooked or ignored. Of 205 companies replying to a questionnaire sent 525 major corporations, 150 said they issued no employee report, 35 issued a special employee report, 8 reported in their house organs, and 12 said their stockholder reports were sent also to employees. A large majority of those not replying may be presumed not to issue employee reports.

However, the small fraction who do

report to their workers for the most part approach the problem with intelligence. The average employee report is much more informative than the average stockholder report. Apparently, where management is sufficiently enlightened to make a special attempt to educate its employees, a real effort is made to tell employees what they want, or ought to want, to know.

A principal hurdle in the preparation of employee reports is that they sometimes call for a new kind of courage on the part of management. Men who calmly launch a new product and risk the loss of millions of dollars frequently shrink from any step that may upset the *status quo* in their labor relations. They move with such caution that they seem not to move at all, and sometimes they don't. Men who are bold enough to tell the whole United States Government to go jump in the lake are white rabbits when it comes to labor policy.



The requisites for a good employee report are not easy to determine. In preparing the report, it is essential to keep in mind the fundamental but often forgotten principle that *both* management and labor are employees. The best report probably is one which fully describes and explains the results of the sum of a year's efforts on the part of both of them to do the best job they know how. In all but the most exceptional instances, in addition to telling what happened during the year, such a report would certainly meet the following conditions:

1. It would be written in the simplest possible language.

2. It would contain a non-technical financial statement with figures in round numbers.

3. It would record any outstanding achievements, such as in production, sales or safety.

4. It would be illustrated.

5. It would carry a clear explanation of the purpose of the company and how it benefits the community or the nation.

6. It would describe the relationship of employee to management and stockholder, and explain how a prospering company benefits all.

7. It would explain how and why dividends are paid.

8. It would record changes in policies, developments in pension or other employee welfare plans.

9. It would contain an honest appraisal of the outlook for the future of the company, especially as regards employment.

10. It would be well designed and well printed—something the employee would take home and save.

Within these general standards there is room for infinite variation and adaptation to individual requirements. A report can be treated in any way from a quiz contest to a series of believe-it-or-not cartoons. The important thing is to have a complete report that will be interesting and understood.

In addition to special reports to employees, there are two other methods of reporting which have been followed. One of these is to send each employee a copy of the regular report to stockholders. In another category are reports included in house organs.

Combining stockholder and employee reports is, on the whole, unsound. The stockholder report probably needs more dignity than is necessary for an employee report; in the latter it is possible and may often be desirable to be "folksy" in the approach, strengthening the feeling of unity and company spirit among employees. It is also possible in a separate employee report to devote adequate attention to individual achievement, both as a recognition of past work and as a spur to future endeavor.

An employee magazine would seem to be an excellent place to print an annual report, and several companies successfully devote a special issue of their publication to this purpose. However, where the report is run merely as a feature, the results are not usually satisfactory.

A number of corporations state that they "encourage" their employees to

ask for stockholder reports. "Encouraging" an employee to secure and to read a stockholder report is like "encouraging" a customer to purchase. It simply will not do the job. A report has to be made so exciting and so interesting that an employee will want to read it, just as a consumption product must be made so attractive that the customer will want to buy.

It is noteworthy that a number of companies not issuing a printed report do make verbal reports at employees'

meetings. Obviously, this type of reporting is better than none at all and, properly handled, especially in conjunction with a printed statement, might be highly effective. But the verbal story does not reach the employee's wife or family, and their good will not infrequently is as important as his own. Moreover, a printed report is a permanent record, and lasts longer than an employee's memory. BY DICKSON HARTWELL. *The Public Opinion Quarterly*, March, 1941, p. 93:9.

### Local Mediation

**A**T LEAST 39 American cities offer mediation in some form or other for the settlement of labor disputes, according to a survey just completed by Professor W. L. Nunn, of the University of Newark. Findings were based on answers to 80 questionnaires returned out of a total of 312 sent out.

Of the 39 cities reporting that mediation is offered, 28 stated that a city official, usually the mayor, tenders his services; three have a specially appointed city mediator; five have panels of citizens to assist in settling disputes; and three—Toledo, Newark and Elizabeth, N. J.—have regularly constituted mediation bodies.

Of the remaining 41 cities reporting, 20 reported a hands-off policy, 10 follow a policy of reporting disputes to Federal or state mediation agencies, and 11 have no definite policy.

—*Labor Relations Reporter* 3/31/41

### Three Decades of Suggestions

**T**HIRTY years ago, Westinghouse Electric & Manufacturing Co. instituted a suggestion plan giving employees an opportunity to profit from their ideas for cutting production costs, increasing sales, improving efficiency, and promoting safety. During the period in which this plan has been in operation, nearly 30 per cent of the more than 81,000 suggestions received have been adopted by the company. One employee has submitted 155 accepted suggestions; others have received as much as \$1,200 for single ideas.

The adopted suggestions have resulted in reducing production costs more than \$800,000, and have brought awards totaling more than \$166,000 to their originators. Many additional thousands of dollars have been saved and incalculable misfortune averted through the suggestions made to improve safety and welfare conditions.

—*Westinghouse Magazine* 1/41

## Rehabilitation of Disabled Employees

**M**ANY industries have established comprehensive systems of industrial medicine and surgery to facilitate rehabilitation of employees disabled through illness or accident. Extensive safety programs have reduced the maiming of workmen to a minimum. Sickness educational programs, however, have not kept pace with safety educational programs, and as a result, many problems are presented by chronically ill employees.

The conservation and reclamation program of the Baton Rouge Refinery of the Standard Oil Company of Louisiana is designed to provide for both classes of disabilities. "Conservation" applies to the part of the program devised to keep partially disabled men on the job and to conserve their working ability as long as possible, while "reclamation" refers to the effort to return to employment those employees who have passed the stage of conservation and have had, of necessity, to lose time from work. Rehabilitation takes place on the job, instead of by some form of vocational training prior to returning employees to a remunerative occupation.

The Baton Rouge program aims at making the disabled person a good wage-earner. An occupation is chosen for which the disability is the least handicap. The procedure of placing an employee at work prior to his becoming 100 per cent physically capable works to the advantage of both employer and employee, for: (1) If an

employee draws full-time sickness benefits, this represents 100 per cent loss to the company; but if he is returned to the job when only 25 per cent efficient, this represents an economy of 25 per cent of his salary. (2) Light work with wages is the best method of overcoming the lethargic condition of mind and muscles produced by a long illness.

Founded on a well-rounded plan of medical service, this company's program includes:

1. Careful selection of new employees.
2. Prevention of disease and accidents.
3. Constant health supervision.
4. Adequate medical and surgical care of all disabled.
5. Sufficient compensation for the disabled man and his dependents to live on while he is undergoing reclamation.
6. Practical training in the plant for all employees, including the man who is prevented from returning to his old job because of disability.
7. Proper selection of work according to physical and mental qualifications of each individual, including proper choice of work for the handicapped man upon recovery.

The medical department keeps a perpetual inventory of the handicapped employees, showing each employee's percentage of disability in his original job, his percentage of disability (if any) in the job he is doing at present, and indicating when his physical condition should be rechecked to ascertain whether his status should be changed.

A thorough physical and mental examination prior to placement of handicapped employees is essential to determine their actual ability or inability to

perform specific jobs. The next important step is the placement of the individual in accordance with his ability. For example, the guard department probably offers the most opportunity to one-armed men. Conditions in the Refinery prevent the employment of men with crutches, but it is possible to find places for men with artificial legs. A potential cardiac may do fairly heavy work if not too much stair-climbing or lifting is involved; office jobs are not satisfactory for these men if there is much running on errands. Places have been found for those recovering from severe head and back injuries, in the process department and on light jobs in the mechanical department.

At this time 122 employees, or approximately 2.8 per cent of the entire personnel, come under either the conservation or reclamation program. Seventy-four of them have been placed in the mechanical department, 21 in the process division, 20 in the coordination division, and seven in the technical division.

Seventy-one employees must be shown consideration because of disability from illness not attributable to their jobs. Collectively, this group was 70 per cent disabled for their original jobs, and in 39 instances it has been found necessary to transfer these men to new and lighter jobs. In their new jobs these employees are only 14 per cent physically disabled.

Thirty of the employees covered by the program have suffered disability as a result of industrial accidents; col-

lectively these workers have been 75 per cent physically disabled for their original jobs. In 20 instances it has been necessary to transfer them to new and lighter jobs. This group is now 88 per cent physically efficient as placed.

Non-occupational diseases causing disability in white employees conform fairly closely to the causes of death throughout the nation—namely, heart disease, tuberculosis, etc. In the case of colored employees, syphilis is by far the outstanding offender and causes over 60 per cent of disability due to illness under the health conservation program.

The reasons for favoring the disabled employee are purely business reasons:

1. Labor turnover is reduced. These men are more hesitant about changing jobs than the able-bodied.
2. The program creates loyal employees. These men appreciate the opportunity given them to work.
3. Tardiness and absenteeism are reduced. As a rule, these workers take a more serious view of life, do not use alcohol, stay home nights, and avoid experiences that lead to sickness.
4. These employees take pride in their accomplishments—a reaction from days when they thought themselves cripples.

BY I. L. GEORGE and CHARLES E. ALLEN, JR. *Industrial Medicine*, March, 1941, p. 83:5.

## Life Span Gains for Industrial Workers

THE average length of life of industrial wage earners in the United States and Canada has reached an all-time high figure of almost 63 years as a result of the excellent health conditions which prevailed among them last year. This is the conclusion of statisticians of the Metropolitan Life Insurance Company based on the experience of the insurance company's millions of industrial policyholders.

This gain in expectation of life represents an increase of about six months over 1939. The 1940 mortality rate of this insured group repeated essentially the 1939 all-time low figure of 7.60 per 1,000.

Factors which played an outstanding part in keeping the 1940 death rate down to the 1939 level were the all-time low mortality rates established for 10 different causes of death, with the sharp decline in mortality from pneumonia—one of these 10 causes—ranking as the year's most important public health development. The other causes of death with record low mortality rates were tuberculosis, appendicitis, diseases of the puerperal state, measles, scarlet fever, whooping cough, diphtheria, diarrhea and enteritis, and homicides. Decided improvement in influenza mortality, and fewer suicides, also were recorded. The accident fatality rate showed but little change.

Unfavorable phases of the 1940 health picture were limited almost entirely to increased mortality rates for diseases of later life, such as cancer, diabetes, and diseases of the heart, kidneys and arteries.

—*The Chronicle* 3/14/41

## How British Industry Aids Raid Victims

AIR raids have brought a new risk which industrial workers in Britain share with the community generally—the sudden destruction of home and property and the death or injury of members of the family by enemy action. To meet the need for immediate and personal help occasioned by such misfortune, a large number of British firms have organized various measures of assistance for their employees.

Funds in some cases are provided out of a capital sum allocated by the firm; for example, Vickers-Armstrongs Ltd. has created a large fund to provide lump-sum payments in cases of death, disablement, and loss of property; Joseph Lucas Ltd. provides in a similar way for cases of death and disablement and has a property compensation scheme to which the company contributes £500 per month and employees 3d. per week. Contributory schemes are the more common. Often the initiative comes from a group of employees and the scheme is established on an informal basis, collections being taken to which employees contribute what they wish and from which both contributors and non-contributors benefit.

Among other services provided in different cases for air-raid victims are safe deposit of valuables, removal of furniture in the firm's lorries, temporary storage of furniture where space is available on the firm's premises, temporary accommodation and feeding for homeless families, billeting of children with employees in another branch of the firm. Leave with pay is often granted, and a small number of firms have rest homes or other arrangements by which employees suffering from shock may secure a recuperative period in the country.

—*Industrial Welfare and Personnel Management* 2/41



## Training for Defense by Home Study

**T**HE national defense program to a considerable extent is shaping the policy of well-established correspondence schools, and enrolment in technical and engineering courses has increased significantly since the program got under way.

There are approximately three-quarters of a million students, mostly adults, enrolled each year in one or more of the numerous home study courses now available. The attitude of modern business toward home study courses is shown in the fact that more than 5,000 industrial and commercial corporations, including railroads, banks, manufacturing concerns, department and chain stores, and several branches of the military service, have some kind of contractual relations with home study schools.

One of the largest individual patrons of home study is the United States Government. The Navy through its Marine Corps Institute and Coast Guard Institute offers to its enlisted men more than 200 vocational courses by the correspondence method. The Army through

its Army Air Corps Institute offers an equal number of courses.

International Correspondence Schools recently reported a student body of 95,000 and announces that enrolment has jumped since a shortage of skilled men in defense work became acute. I.C.S. reports also that the average age of its enrollees is 27 years and that about 70 per cent of them are following technical pursuits.

Some of the jobs for which men are being trained through home study are: aviation engines, maintenance, airplane instruments, aviation mechanics, radio operation, marine engines, navigation, diesel engines, electrical engineering, mechanical engineering, heat treatment of metals, electrical and gas welding, machine shop practice, mechanical drafting, air conditioning, ship drafting, steam-electric engineering, steam power engineering, steel mill work, surveying and mapping, petroleum refining, toolmaking, building contracting, automobile engines, automobile technician, reading shop blueprints, and refrigeration.

## *Wages and Hours of Union Motortruck Drivers*

**A**VERAGE hourly rates for union truck drivers and helpers as of June 1, 1940, were 2 per cent higher than comparable 1939 scales. However, this represents the smallest year-to-year increase since 1936. The actual average rates in 71 cities as of June 1, 1940, were 80.5 cents for drivers and 66.1 cents for helpers. Maximum weekly hours declined 0.9 per cent from the 1939 average. The average full-time weekly hours for drivers and helpers were 47.2. Scales of drivers and helpers working on other than a straight-time basis are not included in these figures.

—Monthly Labor Review 2/41



# *Production Management*

## Hours of Work in Wartime

**I**N THE earlier stages of the last war, British workers were often called upon to labor for more than 70 or 80 hours a week for many months on end, and their sickness and loss of efficiency became so marked that a "Health of Munition Workers Committee" was appointed to inquire into the subject. As the result of numerous investigations, the Committee came to the conclusion that the best way of bettering the health and efficiency of the workers was to reduce the hours of work considerably below those usually in force, and at the same time to improve the environmental conditions in the factory.

The problem of fixing the actual hours to be worked is by no means a simple one. Peacetime data obtained in a number of British factories engaged in general engineering, and the production of ordnance, army clothing, and boots, indicated that the men were able to attain as good an output in a 48-hour week as in one of 54 hours. But in wartime the strong incentive of patriotism would be likely to stimulate them to work efficiently for longer hours.

During the last war much statistical information was obtained at a large fuse factory, whose 10,000 workers were mostly employed in manufacturing time fuses. A group of 100 women, who were engaged in turning aluminum fuse bodies on capstan

lathes, were found to quicken their speed so substantially when their hours of work were reduced that they attained a 13 per cent greater output per week in a 55½-hour period than in a previous 74½-hour period. The weekly output of a group of youths engaged in boring top caps by means of semi-automatic machines was only 7 per cent less when they were on a 60-hour week than when on one of 76½ hours.

Operatives employed purely on hand work which is in no way hampered by machinery have the best opportunity of all for improving output when hours of work are reduced. An occupation of this character was investigated in a group of men who were engaged in the strenuous task of sizing fuse bodies. At first the men worked an average of 66¾ hours weekly. They then dropped to a 60-hour week (with some Sunday labor), and finally to one of 55½ hours, without Sunday labor. With the reduction of hours, their speed of production improved so much that they achieved a 19 per cent greater output each week in the final system of working hours than in the original one.

Owing to their stronger physique, men can undoubtedly work for longer hours than women if engaged on a similar type of work, but usually their work is of a heavier character. For the above-mentioned group of men en-

gaged in sizing fuse bodies, a 54-hour week was probably the optimum, but men employed on lighter work such as toolsetting and toolmaking can usually work for 60 hours a week or rather more without undue fatigue. Adult women engaged on munition work ought not to be called upon for more than 54 hours of work a week; indeed, it might be found that their output would be maintained in a 51- or 48-hour week.

In addition to determining optimum weekly hours of work, it is important that attention be paid to the question of cutting them up into the most suitable length of work spells, and to the interposition of rest pauses. With a 10-hour working day it is usual to adopt two five-hour work spells, separated by an hour for dinner, but such long spells of undivided work throw

rather a strain on men and a considerable strain on women. They ought to be cut in half by the interposition of a rest pause of about 10 minutes' duration, during which tea and other light refreshment can be taken.

In the absence of a rest, many workers, and especially those engaged on repetitive tasks, suffer so much from boredom that their output gradually falls off as the middle of the spell approaches, and may drop as much as 15 per cent. Then it improves again as the end of the spell gets nearer. There is no doubt that boredom is a potent source of slackness and inefficiency in many workers, so every reasonable measure should be taken to reduce it. BY DR. H. M. VERNON. *Industry Illustrated*, February, 1941, p. 11:2.

### ***Industrial Accidents in 1940***

**O**CCUPATIONAL accidents in 1940 resulted in 17,000 deaths—a 10 per cent increase from the 1939 total of 15,500—according to preliminary figures released by the National Safety Council. Injuries resulting in permanent or temporary disability numbered approximately 1,400,000. Wage losses, medical expense, and the overhead costs of insurance totaled about \$650,000,000.

With current estimates showing 6 per cent more employees in manufacturing, and total non-agricultural employment up 3 per cent from 1939, there is every indication that the hiring of new employees and special emphasis on increased production have resulted in an increased accident rate.

The industrial commissions in 30 states received reports of 8 per cent more occupational deaths in 1940 than in 1939. In 20 of the states, death totals increased. Only eight states showed decreases, and two had no change.

Further evidence of increased accident rates in 1940 was found in the reports of companies entered in local and national safety contests. The average accident frequency rate in contests conducted by community safety councils was up 5 per cent from 1939, and the severity rate rose 21 per cent.

—National Safety News 3/41

## How One Manufacturer Speeds Defense

**A**MONG the companies which have taken unusual steps to speed production through subcontracting is one that turns out goods of extreme importance to defense—the Sperry Gyroscope Company, Inc. Sperry manufactures a wide variety of complex mechanical and electrical equipment for the military services, all of which must be produced to close tolerances.

In less than two years, Sperry has increased its rate of production more than 500 per cent. And, notwithstanding the complexity and precision of the work, and the rapidity of the expansion, Sperry has maintained the ratio of subcontracted machining to total machining at 35 per cent and expects to keep this ratio through a further large expansion of production now taking place.

This did not just happen. It took planning, advance preparation, and required some unusual activities. Sperry feels the end justified the means.

Here are some highlights of this company's subcontracting program:

1. Sperry maintains a forecast of total load as far ahead as possible. This is done by frequent contact with the Government services, and by taking into account the probable effect upon its production of new legislation and Federal appropriations. In this way, fairly accurate forecasts can be made long before the U. S. Military Services are in a position to express their requirements officially in schedules, invitations to bid, or letters of intention.

(Well before the fall of France, Sperry had been able to translate defense needs which then were only indicated into terms of its own product and capacity.)

2. Responsibility was fixed for determining what parts could be subcontracted. Sperry delegated this responsibility to its Methods Department. There, from operation sheets, it was decided what parts did not require the special processes, unusual machine tools, or extremely close precision which might be hard to find in subcontractors' plants. These parts were released for subletting.

3. Then responsibility was fixed for finding, investigating, developing, aiding, and cooperating with subcontractors. A new Subcontracting Department was created for this responsibility. At its head was placed a man familiar with Sperry's tools and manufacturing processes. Under him were appointed as assistants a number of experienced factory methods engineers. The Subcontracting Department recommends suitable subcontractors to the factory manager. After he approves, a small educational order is usually placed. If the work is satisfactory, larger orders follow. The Subcontracting Department is held responsible for arranging with all other departments of the company for any assistance or cooperation which may be needed by the subcontractor. This includes the full- or part-time service of methods engineers, tool designers, inspectors, design engineers,

and in some cases planning and production specialists.

In some instances it has been necessary for Sperry to extend direct financial assistance to subcontractors. Subcontracts are usually worked out on a negotiated basis, because Sperry often has had more experience in producing a particular subcontracted item than the prospective subcontractor and is

therefore better able to estimate costs, time, and similar factors.

This broad program required time and planning. This included training—before they were needed—of numerous foremen, methods engineers, design engineers, and inspectors.

*National Defense* (Special News Letter Supplement, National Association of Manufacturers), March 8, 1941, p. 3:1.

### ***Hurt by Fellow Employee***

**W**HEN one employee is hurt as a result of the negligence of another, is the employer of both legally and financially responsible for the injuries?

"The common law rule," said the Court of Appeals of Georgia in a recent case, "is that an employer who has exercised the requisite degree of care in performing the personal duties owed by him to his employees is not answerable to one of them for an injury which is the result of the negligence of others in the same service."

But it's also the law, as the court points out, that if one employee is hurt through the incompetence of another employee whose incompetence is known to the employer, the employer is liable for the injuries.

"It must appear," explains the court, "that the employer knew, or by the exercise of due diligence should have known, of the incompetency at the time of the employment; or else that the employer negligently retained such fellow employee after he was fairly chargeable with knowledge of such incompetency."

But suppose the injured employee had good reason to know of his fellow employee's incompetency?

"An employee," says the court, "cannot recover from the employer for injuries received by reason of the incompetency of a fellow employee if he by the exercise of ordinary care could have known of such incompetency." (Strickland vs. Foughner, 12 *Southeastern Reporter*, second series, 371).

—*The Manufacturing Jeweler* 3/20/41

#### **AMA SPECIAL PRODUCTION CONFERENCE**

***A Special Conference of the Production Division of the American Management Association will be held on Wednesday and Thursday, May 21 and 22, at the Hotel Astor, New York City.***

# Marketing Management

## Selling Your Goods to Soldiers

**T**AKE Private First Class Joe Smith. His army pay is \$21 per month for the first four months of his enlistment. After that, \$30 a month. He needs, especially when he first enters the army, vast quantities of candy, ice cream, soft drinks, and perhaps beer. He needs shoe polish, saddle soap, cigarettes. If he is flush, he may want a small radio receiver, or he may wish to send his girl, his wife or a friend some souvenir of his army life. He needs haircuts, shines, tailor work.

All these articles and services may be purchased from the Post Exchange, where he more than likely has a "charge account," good within limitations until next payday. Multiply Joe Smith by 1,052,000 (the present strength of our armed forces), and then multiply that by any amount from \$3.00 to \$7.00 a month, and you have at least a rough idea of the tremendous market for goods and services controlled by the Army's system of Post Exchanges. In the Navy the same accommodations are extended to sailors through what the Navy calls Ship's Service.

If the \$7.00 a month estimate is correct—and this is the figure most often mentioned by army officers—the annual figure is \$84,000,000. Business men who deal in goods which soldiers buy can well afford to study this market. Most people think anything connected with the Army is bound up in red tape.

Actually, the reverse is true. Army affairs are usually simple, based on long experience and considerable common sense. Selling to Post Exchanges is as simple as selling to any store owned by a civilian, and simpler than selling to most civilian stores.

In large posts there may be several exchanges. Thus, there may be one Post Exchange and regimental exchanges. The regimental or other unit commander has two choices: He may establish a regimental exchange, or he may buy stock in the Post Exchange.

Each Post Exchange is under the direction of the Post Exchange Officer, who reports to, and is at least partially controlled by, the Post Exchange Council, made up of commanders of all units owning stock in the exchange. Dividends declared go to the various units holding stock in the exchange, and may be used for different purposes, provided they are for the benefit of the entire personnel of the unit.

Except in very small posts where the business does not warrant salaried employees, the actual work of operating the exchange is carried on by civilian employees. Usual or routine purchases are made by these civilian employees or by the Post Exchange Officer. Where investments are made in equipment, such as a soda fountain, a new showcase, or perhaps a refrigerator, approval of the Post Exchange Council is required.



There is no such thing as centralized buying. Each Post Exchange Officer buys as his judgment and experience dictate. There is no need to see anyone but the Post Exchange Officer to sell a bill of goods. Above all, do not write or visit the War Department in Washington, or even a Corps Area Headquarters and expect to improve your chances of selling your product to Post Exchanges.

Credit allowed to each man per month is \$7.00 at both a Post Exchange and Ship's Service. From the latter, coupon books can be obtained and the cost charged against the individual's monthly pay. The coupons are itemized so as to allow only specified amounts of money to be spent on certain articles. About \$1.50 of the \$7.00 is allotted for cigarettes and candy. Anything over this amount must be paid for in cash.

Fast-moving stock such as cigarettes, candy, tobacco, stationery, pencils, toilet articles, magazines, and unit identification pins are dispensed from both

the Ship's Services and Post Exchanges.

Radios, when they are purchased, are bought right after the first of the month (payday). Most gift buying is done, naturally enough, around Christmas, when such things as jewelry, radios, ties, scarfs, towels, and toilet sets begin to move rapidly. About 5 to 8 per cent of total sales is gift merchandise.

On all Ship's Service merchandise there is generally a 16 per cent markup, but this varies in proportion to the needs of a welfare fund that has been set up.

Concessions of Post Exchanges are very common. With proper permission, a few concessioners can operate their individual businesses under contract to the Post Exchange for a certain percentage of their profits.

At Fort Sheridan, Illinois, and probably many other posts, pass pictures are furnished to salesmen who visit the Post Exchange.

*American Business*, March, 1941, p. 24:4.

## Wanted: More Logic in Hiring Salesmen

**M**ARKETING management endeavors to utilize science and systematic research. There is no reason why the same principle should not be applied to the discovery and development of men with potential sales talent. No universal rules are likely to be discovered; it is more probable that each company will have

to set up its own standards by painstaking research.

Large concerns which have hired and fired hundreds of men over a decade or so have an opportunity to do statistical research which is not available to smaller organizations. This research will study the records of present and past salesmen, tabulating the kinds of experience which have been



brought to the company by all salesmen and endeavoring to find differences in backgrounds between the good salesmen and the poor salesmen. The value of such investigation, of course, is largely corroborative, and the results should be interpreted in the light of other findings, such as the interview itself, the sales aptitude test, references, and detailed study of the applicant's record as indicated by the data given on his application blank.

In the case of small concerns with only a few salesmen, intensive analyses must be made. These analyses should first consider the requirements of selling positions for the company. Not only will it be found that there are two or three distinct types of selling possible, such as wholesale, retail and commercial, but the classification may be urban or rural; or it may be dependent upon the type of product sold, geographic peculiarities, competitive prices, etc. In any event, a company should identify distinctly the major types of selling which it undertakes. Next it should prepare a job analysis for each type, which analysis will state the normal duties of the salesman, itemize his responsibilities, list the conditions under which the work is performed, and set forth in detail the physical, intellectual and emotional requirements of the task.

With such an analysis before him, the sales manager should next study several of his good men in each particular selling class in contrast with several of the poor ones, matching each one against the job requirements. Not infrequently an analysis of this

kind, used with both good and poor salesmen, will reveal the outstanding traits which are so essential that they may be demanded of new men. It may also show ways of upgrading present poor men, or it may indicate how hopeless it is to continue such men in their present assignments.

The method of analysis forces the sales manager to clarify his thinking as to job requirements. Having done this, he is in a fair position to determine what kinds of prior experience will most likely yield men capable of meeting those requirements.

As a further step, each company should dig up the application blanks of present employees and also of employees who have left its service. If the blanks for present employees do not exist, those employees should be asked to fill them out as of *their dates of employment*. In this event it will be necessary to explain to present employees what the object of the research is.

It is next necessary to set up some measurement of sales ability for present employees and if possible also for past employees. It is better that this measurement be objective or, at least, that superiors' judgments be checked by studies of records of sales productivity. Generally it is sufficient to establish five classifications of sales ability—e.g., outstanding, good, average, poor, deficient. It is advisable that approximately one-fifth of the group being studied be classified into each of these headings. That is, if there are 60 salesmen involved, approximately the 12 best should be classed as out-

standing, and the 12 poorest as deficient.

What is desired is to determine whether there is any relationship between selling success and such factors as age, education, years of experience, highest previous salary, marital status, number of dependents, memberships in organizations, and similar facts which can be elicited at time of employment. In order to determine whether such relationships exist, charts should be prepared for each item under consideration. Where a chart reveals some relationship between the factor as it existed at the time of employment, and sales success, it should be set aside for inclusion in a device which will ultimately summarize the value of an application blank.

After a company has set up tenta-

tive standards and weights based on the kind of experience and the application factors, it should establish *pro tem* a passing grade. If the maximum number of points is 50, scoring of present competent salesmen might show that they average 38 points, while present poor salesmen average 22. In this case, the company might well set as a passing score 30 points.

An adaptation of the research advocated in this article can frequently be made to determine the probability of success if employees in other positions are promoted to selling jobs. A few concerns have found, for example, that they can apply much the same standards except that a lower score may be acceptable as a passing grade. BY EUGENE J. BENCE. *Sales Management*, February 1, 1941, p. 18:5.

### Newspaper Advertising

NEWSPAPER advertising, often termed the "life blood of retail trade," cost national and local distributors about \$567,000,000 in 1940. About \$157,000,000 of this was national advertising, \$410,000,000 local, according to estimates of the American Newspaper Publishers' Association. Newspapers' revenues from advertising are generally about double their income from subscriptions and sales.

National advertising expenditures in newspapers in 1939 were concentrated chiefly on three groups of products—groceries, automotive, and alcoholic beverages. Grocery advertising accounted for approximately 22 per cent of the total expenditures, automotive for 17 per cent, and alcoholic beverages for 11 per cent. Next most widely publicized products were tobacco, 9 per cent of total national advertising; medical, 7 per cent; toilet requisites and transportation, each 6 per cent.

Leading department stores throughout the country reported that 85 to 90 per cent of their total advertising outlays went into newspaper copy. Their advertising is, of course, done principally in local papers. It was pointed out that differences among markets should be carefully considered in local advertising. A survey by a chain of newspapers showed, for example, that the biggest day for downtown shopping in Pittsburgh was Saturday; in Washington, D. C., Friday, and in Houston, Monday.

—Dun's Review 2/41

## How Is Direct Advertising Planned?

**D**URING January of this year, *The Reporter* received from 467 business organizations a detailed statement showing how they planned their direct mail advertising. Eighty-six per cent of those responding revealed a total annual advertising budget of \$36,724,434, and a total combined mailing list of 37,951,876. A summary of the salient findings of this survey follows:

(1) The arithmetical average of all returns shows that 56.75% of the total advertising budget is used for direct advertising, with amounts varying for individual companies from less than 10% to 100%.

(2) The arithmetical average of all returns indicates that the average concern spends for advertising 5.76% of its total annual sales, but this amount varies from .5% low to 40% high, depending on the nature of the business.

(3) 57.2% of the firms surveyed fix their advertising budgets by estimating a definite amount to accomplish a given end; 17.2% use a fixed percentage of actual sales for the past year; 20% use a fixed percentage of estimated sales for the coming year; while 5.5% use a definite amount established to meet the efforts of competitors.

(4) The months in which advertising budgets are fixed vary greatly in different organizations. More than 50%, however, set up their budgets for the year either in December or January.

(5) 54.4% of the reporting organi-

zations use market research before planning their direct advertising; 45.6% do not. Of those using market research, 49.4% do all of it by mail, while 50.6% use personal contact.

(6) 64.8% report that they coordinate their direct mail with other forms of advertising, with trade or business paper advertising showing greatest amount of coordination. 64.4% plan their mass-coverage advertising so that it can be adapted to or changed into direct mail.

(7) The firms that reported a total of 37,951,876 names on their mailing lists operate as follows: 91.7% maintain their lists in their own office, and 12.6% have their lists maintained wholly or in part by a professional producer; 16.7% purchase lists for the occasion.

(8) 63.4% say that all direct mail advertising is planned within their own advertising departments; 18.6% say that the advertising agency aids in the preparation; 12.1% say that the creative printer aids; and 11.6% say that they have the assistance of an outside direct mail specialist.

(9) Mailing work is handled within the advertising departments of 86.3% of the reporting organizations, while 29.5% have all or part of their mailing work done outside.

(10) January seems to be heaviest mailing month, with March a close second. Best mailing months vary according to classification of business.

(11) 31.3% use some sort of definite technique in predetermining best mailing dates; 68.7% of the reporting firms use no system. Most popular methods of predetermining mailings are: stock market activity; charts of monthly sales records; records of seasonal buying; weather in agricultural and retail

fields; business services, such as Kiplinger, Dodge, Babson, etc.

(12) The biggest problem encountered in direct mail work seems to be (by popular vote) getting and maintaining the right lists.

*The Reporter of Direct Mail Advertising*, January-February, 1941, p. 15:11.

## Cutting Costs on Salesmen's Automobiles

**T**O SUPPLEMENT its 1940 survey of salesmen's automobile allowances and upkeep practices, the Dartnell Sales Service has just completed a study of methods for effective savings. The current study covers the operation of about 36,000 cars traveling a total of 670,000,000 miles.

One of the startling disclosures is that practically all the 150 companies whose fleet figures were analyzed could effect savings in excess of \$3,000,000 total by closer control. The reason is that, even in the case of the most efficient fleet operators, one or more cost factors run higher than they should.

On a mileage basis, costs varied from 2½ cents to 6 cents a mile. An insurance company pays 4.4 cents a mile to operate 500 employee-owned cars over 5,000,000 miles annually; a nationally-known finance company reports the low cost of 2.86 cents a mile; a company-owned fleet covering the grocery trade reports 400 cars cost 2.9 cents a mile. All charges are included in these figures.

Company-owned cars showed the lowest cost figures. An average cost of 3.54 cents a mile was found for 11,500 company-owned cars, while salesmen-owned cars in over 100 fleets ran higher even though some company allowances were down to 2.5 cents a mile. Some allow 5 or 6 cents a mile, with company executives admitting this amount is high. There is considerable doubt as to whether this is good practice.

Overpayment of automobile expense is misdirected spending, according to many executives. Usually it is not appreciated by salesmen. Overpayments that are ordinarily winked at by sales managers or allowed because of lack of information would be better used for some more creative purpose—for some specific promotion plan, for extra compensation in rewarding meritorious work, for prize plans that provide incentives for extra sales effort.

The broad study of operating costs made possible in this investigation reveals that the average annual cost of a company-owned car used by salesmen

is \$708, that the average mileage is 20,000 a year, and that trade-ins prove most economical between 24 and 30 months, at about 45,000 miles.

If a saving of one cent a mile can be effected, this would amount to \$200 a year a car—\$2,000 a year for 10 cars, or \$200,000 a year for 1,000 cars.

If you happen to have more than 100 cars operated by employees, what should be done in your particular case may be determined by a special study of the situation. *News Letter*, Dartnell Sales Service, March 15, 1941, p. 2:2.

### ***The Profit in Unreasonableness***

**E**VERY business should get itself a highly unreasonable, cantankerous, and generally unprofitable customer.

Then it should turn itself wrong-side out trying to please that account and make a profit on it at the same time.

The unreasonable customer serves as a gadfly to keep everybody in the company on his toes. He can spot infinitesimal lapses in quality and will yell as lustily about virtually non-existent flaws as the average customer would if you delivered a consignment of time-bombs to him. He will watch your bills so closely that if your bookkeeper ever takes the cent on a split-penny total he will threaten you with the Federal Trade Commission.

A dozen times a month you will long to Tell Him Off, and the lesson in self-restraint will be invaluable. You will undoubtedly never please this unreasonable customer, but in the trying you will develop an organization that will be the delight of your other customers and the despair of your competitors.

—*The Postage Stamp*

#### **AMA MARKETING CONFERENCE**

***The Annual Conference of the Consumer and Industrial Marketing Divisions of the American Management Association will be held on Tuesday and Wednesday, April 22-23, at the Hotel Roosevelt, New York City.***



## ***Telling Stockholders About Employee Relations***

**T**HE annual report is generally the means used to tell stockholders about personnel activities, though on occasion stockholder meetings, the interim report, special booklets, dividend enclosures or other mailings may be used. A few companies send the employees' magazine to stockholders.

To determine the extent to which companies are informing stockholders of personnel activities through the annual report, the Policyholders Service Bureau of the Metropolitan Life Insurance Company reviewed the 1938 and 1939 reports of 235 companies—including manufacturing, distributing, mining, public utility, railroad and financial organizations. A few 1940 reports were included also.

More than two-thirds (162) of the annual reports of the 235 companies give their stockholders some information on employee relations and activities. This is in contrast to one-fourth of the 1934 and 1935 annual reports of 161 companies covered in a previous study of the same subject. In a still earlier study, made in the twenties, it was stated that "information bearing on a company's personnel activities is found from time to time in the company's annual report."

Employee security ranks high in the discussion of employee relations in annual reports. Group life insurance was the subject considered of interest to stockholders by the largest number of companies—69 of the 162 which discussed personnel questions in their annual reports. Other subjects covered, listed in the order of the number of reports in which they are discussed, were: (1) discussions of the total number of employees—usually indicating that the companies are either increasing or maintaining employment, (2) pensions, (3) disability benefits, (4) accident prevention, (5) wage rates and wage increases, (6) vacations, (7) length of service, (8) education and training of employees, (9) basic employee relations program, (10) hours of labor, and (11) the Social Security Act. The four leading subjects in the 1938-1940 reports were the four leading subjects in the 1934-1935 reports—although not in the same rank.

There has been a marked decrease in the percentage of annual reports considering employee representation plans, employee stock-ownership savings plans, medical and health service for employees, and home-ownership plans.

—Policyholders Service Bureau, Metropolitan Life Insurance Co.

## ***Notes on Telephone Listening***

**H**OW many words of a telephone message must you hear correctly in order to get the message? In testing the clarity of voice reproduction of three telephone systems, it was found that only a few words heard correctly were serving to establish a whole sentence in the mind of the listener.

In these tests five stenographers took dictation over the phones, then compared their transcripts with the original dictation. So accurate was their reporting of sentences over each phone, despite faulty voice reproduction of one phone particularly, that it was obvious some "crutch" was helping them.

The clue to the mystery lay in the very high percentages (90 to 96 per cent) of correct reporting in each case. This meant that only a few words heard clearly were serving to establish an entire sentence.

So the engineers compiled 12 lists of one-syllable words, juggling 22 initial consonant sounds, 15 vowel sounds, and 18 final consonant sounds until 600 words had been put together. This time the stenographers had no word associations to lean on, and heard only 21 to 47 per cent correctly over the telephones. This wide variation provided ample evidence for comparing fidelity of telephone systems.

—Testimony, Electrical Testing Laboratories 2/41



# *Financial Management*

## **Escalator Protection in Contracts**

**T**O LEARN what measures manufacturers are taking to protect themselves against possible increases in costs of production during the life of long-term contracts, the Conference Board recently sent questionnaires to several hundred companies.

Replies were received from 321 concerns engaged in a wide variety of manufacturing operations. Of this number, 135 stated that they do not make long-term contracts, or for some other reason could not supply information pertinent to the study. One hundred and fifty-three companies returned questionnaires in suitable form for tabulation.

The general tenor of the replies indicates that a great many companies recognize the need for developing a form of contract which provides protection against rising material and labor costs, but that they have as yet taken few positive measures to do so. Many companies which conduct their normal business on a short-term basis have thus far apparently failed to provide for the possibility of having to make long-term contracts if they should engage in government work. Some companies seek partial protection by immediately buying raw materials to cover orders; but these may find difficulty in getting quick delivery on materials that are widely used in the defense program, and they have no

protection against rising labor costs.

The first section of the questionnaire requested information about the length of the delivery period for which companies feel justified in quoting firm prices, and under what conditions they will make contracts for longer periods. The most frequently given period for which firm prices will be quoted is three months—reported by 68 out of a total of 137 companies as the maximum length of time for regular commercial contracts, and by 29 out of 92 companies as the maximum for direct defense contracts. About half as many companies will quote firm prices for four to six months on commercial contracts as will quote for three months. For defense contracts, the number of companies that will quote prices for the longer period is about the same as that for the three-month period. Comparatively few companies are willing to quote prices for more than six months for either type of contract.

Companies generally appear to be willing to quote prices as far ahead for defense work as for commercial work. Sixty-one reports indicated such a willingness. Of 24 companies which gave different lengths of time for commercial and defense orders, 16 would allow a longer delivery period for defense work, while eight would quote prices for a longer period on commercial orders.

When it becomes necessary to make contracts for a period longer than that for which the seller is willing to quote firm prices, an escalator clause seems to be the most popular form of protection. Fifty-one companies indicate a preference for this type of protection in long-term commercial contracts, while 38 companies would use it for defense contracts. The method next in favor is that of quoting current prices subject to confirmation. The 24 companies reporting this practice with respect to defense work presumably had in mind subcontract work, as it is doubtful that this procedure would be acceptable in direct government contracts. The same consideration would apply to companies reporting the use of current prices subject to a limited percentage rise at the company's discretion. Cost-plus-percentage and cost-plus-fixed-fee bases are seldom found in commercial contracts of manufacturers. The cost-plus-fee method is, however, finding considerable use in government construction contracts.

The greatly increased scope of the defense program is making it more and more necessary to turn to escalator clauses in order to enable the contractor to accept long-term government contracts with some measure of safety. The companies whose replies indicate the most experience with the escalator clause are those which would be the first to get work on the defense program, such as manufacturers of airplanes, automobiles, machinery and metal products.

The most common use of these clauses is to provide for changes in

material and labor costs—and when a clause is used for adjustment of one type of cost, it is usually used for the other. Including both commercial and defense contracts, 47 companies reported using escalator clauses for both material and labor costs, while 11 companies use only a clause covering materials, and seven use only a labor clause.

A large number of companies also reported the use of protective clauses to cover changes in taxes or other costs resulting from legislation. Other companies reported that they insert clauses covering changes in costs of transportation, training programs, and contingencies.

When companies use escalator clauses in contracts, the adjustment usually applies to decreases in costs as well as increases. As a result, the manufacturer is protected against rising costs, and the purchaser receives the benefits of decreased costs.

Practice is far from uniform as to the method by which the changes in costs are applied to contract prices. The methods reported most frequently are: (1) to adjust the cost per unit as delivered, or (2) to adjust the average cost for deliveries in a given period, such as a month or quarter. Adjustment on the cost per unit as delivered is the more common method in commercial contracts, but for defense contracts the number of companies reporting each of these methods is the same.

As to the amount of change allowed in the indexes of material prices or of labor costs before a contract adjustment is made, the most common prac-

tice is to allow no change without an adjustment. For changes in labor costs, 13 companies make an immediate adjustment in their commercial contracts, against three which wait until a certain percentage increase has been registered. The ratio is smaller for defense contracts, as 12 companies do not allow any change without adjustment, against eight which do allow a change. Of these eight companies, five reported that they allow a 10 per cent change in labor cost before making an adjustment. When material escalator clauses are used, the number of companies reporting no change allowed in the price index is 16 for commercial contracts, and 15 for defense contracts.

In defense contracts, adjustments provided by escalator clauses are generally based on indexes covering hourly earnings and wholesale commodity prices compiled by the Bureau of Labor Statistics of the Department of Labor. Since considerable diversity of move-

ment, as well as some seasonal changes, can be discerned within these indexes, it is advisable for the contractor to study their composition carefully to determine just how much protection a proposed escalator clause actually affords.

The companies to which questionnaires were sent were asked whether their government contracts contained fair termination clauses. Thirty-three companies stated that their contracts do contain clauses providing for settlement if the contract is terminated before completion. Fifty-one companies have no such clauses. As the defense program progresses, and as the possibility of termination of the war becomes more immediate, an increasing number of contracts will undoubtedly include provision for settlement in case of cancellation. National Industrial Conference Board, Inc., March 19, 1941, 16 pp.

### *These Directors Toe the Line*

**DIRECTORS** of Consolidated Aircraft Corp. who are not employed by the corporation are going on the payroll and will work steadily at their job if stockholders approve proposed amendments to the company's by-laws.

And Heaven help the director who fails to show up at a regular meeting! He will be docked by exactly \$500.

Proposed amendment to be acted on at the corporation's annual meeting would place directors who are not employees of the company on an annual salary basis, plus reasonable expenses. Amount of the salary would be fixed from time to time by directors, with the provision that the aggregate would not exceed \$5,000 each in any one calendar year.

If this is approved, directors propose to fix the annual salary for each director not employed by the company at \$4,000. If, however, such a director fails to attend a regular meeting, the sum of \$500 will be deducted from his pay for each failure to attend.

It is also proposed to amend the by-laws to indemnify directors and officers for expenses incurred in legal actions resulting from their connection with the corporation.

—The Wall Street Journal 3/22/41

# Insurance

## Owner's Protective Bond

**E**NTHUSIASM runs high in insurance circles over the new form of "Owner's Protective" contract bond. This improved bond, designed primarily for use on private construction contracts, affords coverage heretofore unavailable—without additional cost.

Architects are now enabled to protect their clients' interests by specifying that building projects be bonded under the Owner's Protective Bond. Owners and lending institutions will welcome it as an adequate and valuable form of guarantee for the proper fulfillment of construction contracts.

This bond lightens the burden of responsibility on architects and assures owners and lenders an easier mind when undertaking construction operations.

Under the old form, defaults on the part of the contractor have often resulted in confusion, delay in completion, added expense to the owner, and in some cases abandonment of uncompleted projects.

In the event of a contractor's default now, the Owner's Protective Bond guarantees that the surety company will undertake to:

complete the contract, or will, within *fifteen days* after cost of completion is determined, *pay in cash* to the owner the reasonable cost of completion.

Note especially here that this makes it unnecessary for owners to advance more money than anticipated in order to complete. It further relieves the owner of completing the structure himself to determine the loss and also relieves him of the obligation of contesting questionable liens.

Laborers and material suppliers have a *direct* right of action against the surety.

General contractors need no longer be bothered with requests for payment guarantees or even have immediate or advance payment demands thrust upon them. Laborers and suppliers of material need not incur expenses in filing liens, etc., against owners or contractors.

To cover unforeseen conditions in connection with claims, questions or disputes, an arbitration provision is incorporated in the body of the bond.

By HARMON V. SWART. *The Insurance Broker-Age*, March, 1941, p. 10:1.

## Workers Eat on Job, Aid Defense

**T**HE national defense program has been benefiting in Cleveland from the elimination of lunch time by workers in the machine-tool industry. Employees of National Acme Co. several months ago started the practice of working straight through the shift. Workers at the plant of Warner & Swasey Co. eat on the job. This enables them to be handy to their machines, which continue operating.

—*The Iron Age* 3/20/41

# *The Management Question Box*

## **Questions and Answers on Management Practice Based on the Inquiries Received by the AMA Research and Information Bureau.**

*Individual replies are made promptly either by mail or telephone to inquiries received by the Research and Information Bureau. This service is available to executives of concerns holding company memberships. The questions cited here are those which it is believed are of general interest to the membership.*

### **Microphotography in Industry**

**Question:** Do you recommend the use of microfilms for preserving business records? How does the cost compare with that of other methods of record-keeping?

**Answer:** Photographing of records on small-scale film somewhat similar to that used for motion pictures is a process increasingly resorted to by commercial and industrial organizations. Microphotography has two major advantages: it not only safeguards valuable material by providing copies which can be stored at a separate location from the originals, but it also reduces the amount of storage space required when these films may be substituted for bulky original records.

Banks are among the older commercial users. Microfilms of checks, statements, deposit records, and other banking documents began to be used a number of years ago, chiefly as a protection against certain fraudulent practices. Criminal-investigation units have utilized microphotography in many ways. The Federal Government has made considerable use of this method of preserving valuable documents. Other users include doctors, hospitals, and medical research institutions.

Insurance companies are among those which have found especially practical and economical the microfilm method of preserving essential records in greatly reduced space. Industry generally has begun to recognize that microphotography not only reduces storage space requirements but also the amount of filing equipment needed and the labor cost of caring for files.

The cost of keeping records varies, of course, with their bulk and the cost of the space required to store them. The advantage of the microfilm method therefore must lie in a comparison of costs. The cost of films, rental or purchase of cameras and equipment, and labor for handling the records prior to and during the filming operation are the main expense factors that should



be weighed. Records which are in correct filing order may have to be rearranged for filming. However, it should also be remembered that this photographing "binds" the documents in their proper sequence. Such a result in itself is sometimes a decided advantage.

The cost of reference to the microfilm must also be taken into account, since equipment is needed to make reading possible. Screen or wall projectors are commonly used, as direct reading through a magnifying lens is impractical except for very occasional reference.

The legal status of microfilms has not been completely clarified, but we are informed that such copies have been received as evidence by some courts and that the trend is in the direction of judicial acceptance. Companies considering adoption of this type of record probably should consult their legal counsel on this point.

### **Organizing a Credit Union**

**Question:** Have credit unions proved a worthwhile feature of personnel programs? Where may help be obtained in organizing and operating a credit union?

**Answer:** Provision for small loans through the cooperation of a group organized for this purpose is a device which has been used in many countries over a period of about 90 years. The plan has proved so practical and helpful that its use has spread widely in the United States and Canada, till today there are approximately 10,000 credit unions in North America with nearly three million members.

The credit union not only provides loans at a moderate rate of interest but affords employees an opportunity for systematic saving. Experience has shown that it also protects their savings, since practically no losses are sustained. The group organizing such a union is usually sufficiently small and homogeneous for the members to be fairly well acquainted with each other; thus the responsibility for repayment of loans is taken very seriously. Credit unions came through the depression with one of the finest records in the field of banking, and their numbers increased in the United States from 3,525 in 1935 to 8,291 by the end of 1939.

Another advantage of a credit union is that it can be managed by members of the group itself; it does not require the services of experts. Accounting forms and a bookkeeping primer can be obtained either from the Credit Union National Association, Madison, Wisconsin, or from State Leagues which handle these forms in certain states.

The growth of the credit union movement has resulted in the passage of

legislation under which these unions operate, and it is now possible to organize anywhere under the Federal law and in 43 states under state law, if that is preferred. A credit union charter is obtained by application either to the state or Federal government.

The Credit Union National Association is an organization supported by member unions throughout the country. It provides advisory services for members and also for those desiring to organize new unions. The association was established by Edward A. Filene, who is regarded as the founder of credit unions in this country. It was supported for a time by The Twentieth Century Fund but has lately become self-supporting through membership dues. Mr. Roy F. Bergengren was selected by Mr. Filene in 1921 to direct this activity, and he is now the Managing Director of the Credit Union National Association, with headquarters in Madison, Wisconsin.

A recently published study by Mr. Bergengren, "Credit Union, North America" (Southern Publishers, Inc., Kingsport, Tennessee, \$2.00), not only outlines the history of the movement but contains chapters on the organization and management of credit unions. Companies or groups of employees considering the possibilities of a credit union will find much helpful instruction and advice in this volume.

### ***Women in the Labor Market: 1940***

**P**RELIMINARY figures from the 1940 Census of Occupations indicate that the number of women workers has increased markedly since 1930. The 10¼ million women in gainful work in 1930 were considered an important number, but there are now more than 12¼ million women in the labor market—an increase in the past 10 years of about 20 per cent, though the female population of 14 years and over has increased by only 14 per cent. Obviously, the new occupation figures cannot take account of the acceleration due to the defense program, which already has added more and will continue to swell the number, though at present there is no complete measure of its extent.

Women show a significant increase in the proportion they comprise of all persons in the labor market, constituting 24 per cent, or practically one-fourth, of the total in 1940, as compared with 22 per cent in 1930, and about 21 per cent in 1910 and 1920. The figures show that 90 per cent of the women as well as of the men reported in the labor market in 1940 have jobs, about 86 per cent of them in private industry.

—*The Woman Worker* 3/41

---

## *Survey of Books for Executives*

---

**Design for Industrial Co-ordination.** By Robert W. Porter. Harper & Brothers, New York, 1941. 249 pages. \$3.00.

Perhaps one of the most timely books of the current crop is "Design for Industrial Coordination," for it meets industry's urgent problem of expanding its present organization to accommodate emergency production, and do so with a minimum of bottlenecks.

The author's tri-basic theory of co-ordination and realistic design for applying the planning, production and inspection functions to every part of a business would prove invaluable to industry if applied by executives responsible for expanding production.

Mr. Porter holds that the tri-basic functions of planning, production, and inspection apply to every department, section and task comprising a company program, and that when the organizational pattern permits these functions to interoperate freely, within the restrictions of properly placed checks and balances, the greatest benefits of co-ordination are realized. His basic design of co-ordination, therefore, is set up to produce two main effects: (1) motivate, constructively, each work-activity of the organization; (2) bulwark each work-

activity against destructive pressure on the part of owners, workers, customers and vendors.

Each of the factors, forces and elements comprising a management program, Mr. Porter contends, can exercise individual powers for good or evil. Hence a management program is successful to the degree that it stimulates the "good" and restricts the "evil" in attaining its objectives. In a series of original diagrams, the author illustrates how the forces of administration, management and operation employ the processes of planning, production and inspection both to motivate the "good" and to discipline the "evil" activities of an enterprise.

The subject matter has been divided into three parts. The first part contains an illuminating discussion of the basic characteristics of industrial co-ordination, grouped under four topical heads, identified by the author as technical, jurisdictional, functional, and organizational. This treatment is a penetrating analysis of the underlying forces of co-ordination, and gives the reader a fresh viewpoint on those thorny subjects.

In Part Two the author describes how the 21 component factors of co-ordination regulate and balance out the vari-

ous classes of work-activity found in an industrial organization. Work-activities are formally classified under 48 basic heads, purposely arranged to meet the requirements of policy, which the author has divided into 37 pertinent topics. The distinctive breakdowns of coordination, work-activities and policies, which are defined and described in detail, are as thought-provoking as anything I have read in management literature.

The second part of the book also outlines how the specific leadership traits of executives influence the processes of coordination and thereby affect the quality of results secured. The text includes a selected list of 85 executive traits. It is surprising to learn how distinctive mental traits qualify an executive for dominant planning, production or inspection work, and how a plan of coordination is dependent on the balance of traits of its executives.

Part Three discusses the products of coordination, listed as Satisfaction, Value, and Surplus, and explains the manner in which the arithmetic of budgets, income and balance sheets, and supplementary techniques, are used to reflect the degree to which the intrinsic products of coordination are realized. The logic and illustrations supporting this section are particularly impressive and succinct.

The realistic conceptions presented on the subject of coordination arises out of the author's broad experience in a wide variety of industrial fields while engaged in management consulting work. Undoubtedly this book will be read by alert executives who appreciate

the power of coordination. They should find it valuable as a reference book when appraising management policies and practices. It should help executives correct existing bottlenecks and reduce high operating costs. Those who desire to take advantage of the principles of coordination to strengthen company relationships between owners, workers and customers will find this book helpful and stimulating.

*Reviewed by Martin Miller, Vice President, American Machine & Foundry Company.*

**Internal Auditing: Its Nature and Function and Methods of Procedure.** By Victor Z. Brink. The Ronald Press Company, New York, 1941. 549 pages. \$4.50.

Dr. Brink has written a clear and readable treatise on internal auditing. While he carefully distinguishes between internal auditing and internal check or control, he does include a chapter on internal check as a means of maintaining and improving the efficiency of a concern's accounting system.

Dr. Brink is critical of those who regard internal audits as a routine, mechanical safeguard against inaccuracies and fraud. Rather, he would make them a dynamic instrument of management that would provide "constructive analysis" as well as "systematic verification" of the accounting and financial aspects of business operations. To achieve this, the internal audit must be concerned not only with increasing the efficiency of the work of the accounting

department, but also with the further analysis and interpretation of the data provided by the accounting department for the benefit of management.

The author believes that internal auditing will become increasingly important in the future, owing to narrower profit margins in business, increased Government controls, and the greater feeling of responsibility of managements of large enterprises to stockholders and the general public. Already, numerous large enterprises have separate internal auditing departments, under a General Auditor or equivalent executive, reporting either to the controller, treasurer, or directly to the president. He classifies the services of internal auditing as:

1. Activities dealing with compliance with requirements.
2. Conservation of resources of the enterprise.
3. Verification and analysis of data.
4. Appraisal of procedures.
5. Furthering training of personnel.
6. Miscellaneous, such as providing an impartial reporting agency and maintaining contact with field operations.

The elements of an internal auditing program are surveyed by Dr. Brink in Part II of his book. He would base the internal audit upon the following general questions:

1. Are the accounting data reliable and accurate?
2. Have the processes associated with the data been carried on in accordance with company rules and policies?
3. Have the processes associated with the data been carried on with the maximum internal check?
4. Do the processes associated with the data present possibilities of any kind which would further the welfare of the company?

Separate chapters then follow on Cash, Receivables and Investments, In-

ventories, Fixed and Other Assets, Accounts and Notes Payable, Accrued Expenses and Other Liabilities, Ownership Equities, Income and Expense. Additional regular and special activities of the internal auditor are discussed in Chapters 12 and 13. A lucid outline of working papers, findings and reports is given in the following chapter.

The final chapters will be of particular interest to managements contemplating the inauguration or extension of internal auditing departments, or those dissatisfied with results obtained from such a department now. Chapter 15 discusses the evaluation of the procedure in terms of its cost and the benefits derived. The problem of the coordination of internal auditing with the work of the outside auditor follows.

There will be general agreement with the point constantly stressed by the author that many of the deficiencies and faults of internal auditing today are due to a lack of understanding of the scope, functions and possibilities of this procedure on the part of management, public accountants, and some of those presently employed as inside auditors.

*Reviewed by Jules I. Bogen, Editor,  
The Journal of Commerce.*

**Business Cycles: Their Nature, Cause and Control.** By James Arthur Estey. Prentice-Hall, Inc., New York, 1941. 544 pages. \$5.00.

In most fields of study, surveys are numerous and a new one is of little importance. In the study of business



cycles the rule has been to take dogmatic positions on causation at the outset and present colored surveys. Estey's book is notable for having avoided this kind of dogmatism. It is divided into three general parts: the first on description, the second on theory, and the third on stabilization. This tripartite division accounts for the subtitle.

The description section covers a small portion of the book and thus lacks sufficient detail to do more than establish general impressions. The subjects covered range from a description of standard deviation to a brief history of cycles, from a statement of series used to measure the cycle to a panoramic analysis of great depressions.

The theory section approaches the problem topically. Chapters are presented on innovation, the principle of acceleration, agriculture, psychology, money, overinvestment, underconsumption, and saving. In this way the principal ideas are covered and major objections are supplied. The disadvantage of the approach is that cross-comparisons are difficult, while the similarity and contradiction of basic theories are of fundamental importance. Estey's emphasis is on a faithful interpretation of the various theories. Major attention is given to Keynes.

Stabilization measures covered include bank policy, money supply, international monetary relations, public works, consumption volume, wage policy, and price policy. In every case

the inadequacy of the scheme, taken by itself, is clearly demonstrated. On various pages Estey implies that stabilization will some day be achieved by a combination of measures, but he never gets around to indicating even tentatively, the character of the combination. He throws the weight of his opinion, therefore, toward the belief that stabilization must be worked out by intentional schemes of control. Estey recognizes that some fluctuation is beneficial, but part of his discussion is so heavily overlaid with faithful reproduction of other theories that his judgment does not always shine through.

The book contains little on business barometers or on the estimation of the current situation by the study of available data. The forecasting problem is completely avoided. Emphasis is on cultural study rather than on practical application.

Estey is convinced that the phases of the cycle are facts and can be described as such, but that the shift from one phase to another is purely a matter of theory. What is fact and what is theory is always something of a problem, but the reviewer believes that the predilection against shift from one phase to another makes the analysis less complete than it should be. If we are going to face instability intelligently, we need a rounded understanding of how and why prosperities and depressions end rather than limited knowledge of a set of conflicting theories. If Estey had emphasized a

study of the processes of change instead of various theories concocted about them, he would have avoided this difficulty.

*Reviewed by Elmer C. Bratt, Lehigh University.*

**Industrial Conflict: A Psychological Interpretation.** Edited by George W. Hartmann and Theodore Newcomb. The Cordon Company, New York, 1939. 583 pages. \$2.75.

"Industrial Conflict" is the first yearbook of The Society for the Psychological Study of Social Issues. Twenty-six authors—economists, political scientists, lawyers, sociologists, psychiatrists, psychologists, etc.—have contributed.

This is the first attempt of social scientists to integrate the viewpoints of such a diversity of men into one volume. As a book of this sort, it is open to a variety of criticisms.

The volume is divided into five parts, the titles of which give a fairly adequate idea of the general contents:

- I. Orientation in Time and Space: Industrial Conflict and Community Organization
- II. Personal Sources of Conflict: Individual Tensions, Needs, and Satisfaction
- III. Parties to the Struggle: Causes of Group Identification
- IV. Objectives and Procedures: Efforts to Eliminate Conflicts—(A) Forces within Industry Itself; (B) Contributions of Public Opinion
- V. Editorial Summary

The many points of view, the variety of topics, the diversified "scientific"

goals of the contributors, and the uneven quality of the papers leave the reviewer somewhat confused. The editors do not succeed in producing a unified or cohesive volume, despite separate editorial summaries at the conclusion of each section and a double final summary (one for psychologists and one for laymen) at the end of the book.

The reviewer believes that two other operating factors which definitely affect these problems might have been included to make the volume not only more practical and satisfactory to the "layman" but also to the "psychologist." They are:

1. The influence of recent governmental policies—unemployment compensation, wages and hours laws, old-age pensions, social security, etc., and
2. The subversive pressure groups such as "gangsters," "local politicians" and "communists."

However, the business man or executive who has a broad interest in problems of this kind may well spend a few hours reading at least a few of the papers. If he has a specific problem in his plant or organization, he might scan the chapter headings to see if some phase of his problem is covered. In this way he would get another outside point of view—in most instances of a pro-workingman bias.

The book is probably of greater interest to the research man than to the operating executive.

*Reviewed by Albert D. Freiberg, The Psychological Corporation.*

---

## Briefer Book Notes

---

**THE ECONOMIC CAUSES OF WAR.** By Lionel Robbins. The Macmillan Company, New York, 1940. 124 pages. \$1.35. In examining the economic factors that contribute to modern wars, the author rejects the Marxian theory that capitalism leads to war; he then considers aggressive imperialism, but gives special attention to the fear of exclusion from markets and "living space." The essay concludes with a plea that the creation of a United States of Europe should be the leading war aim of the democratic powers.

**DOING BUSINESS UNDER THE DEFENSE PROGRAM.** By the Staff of *The United States Law Week*. Bureau of National Affairs, Inc., Washington, D. C., 1940. 123 pages. \$1.00. A handbook on the laws governing business practices during rearmament. Such points are considered as: rules on bidding on defense orders; negotiating government contracts; securing advances for plant facilities; assigning claims to secure loans; meeting special labor requirements; planning amortization; handling sales contracts with those in military service.

**ADJUSTING YOUR BUSINESS TO WAR.** By Leo M. Cherne. The Research Institute of America, Inc., New York, 1940. 444 pages and index. \$5.00. A revised and enlarged edition of a volume that appeared in 1939, devoted to the effects of war on business. Chapters include: M-Day and the Business Man; The Relationship of War and Business; Neutrality and Foreign Trade; Government Buying After M-Day; The Industrial Mobilization Plan; Effects of War on Prices, Securities and Credit; Manpower Mobilization; War Cost to Business and the Individual.

**HOW TO WRITE BETTER BUSINESS LETTERS.** By Earle A. Buckley. McGraw-Hill Book Company, Inc., New York, 1940. 201 pages. \$2.00. A second edition of a book giving a step-by-step description of methods and pointers to help the business letter-writer. The principles involved and the procedure to be followed in the preparation and dictation of letters are outlined.

**HOW TO TEACH A JOB.** By R. D. Bundy. National Foremen's Institute, Inc., Deep River, Connecticut, 1941. 63 pages. \$1.00. This manual is intended for foremen, supervisors, job setters and vocational instructors—those who teach the new worker how to do his job. The reader is taken step by step through various stages of the teaching process. Plentiful, practical illustrations help to make clear the application of basic principles.

**THE MANAGERIAL REVOLUTION.** By James Burnham. The John Day Company, Inc., New York, 1941. 285 pages. \$2.50. This volume warns that our present capitalistic order of economy is in its last stages and that the most important symptom of this decline is our continued mass unemployment. The author declares that he advocates no new order, but he holds that whatever system the future will bring there will be a place for "the managers"—the "doers" who are as necessary to socialism as to capitalism, and for whom, under any regime, there will always be work.

**SECRETS OF CLOSING SALES.** By Charles B. Roth. Prentice-Hall, Inc., New York, 1940. 194 pages. \$2.50. A book devoted to that most vital of all phases of the sales contact—the closing. The author has concentrated all the lessons of a broad experience on this one aspect of selling. He analyzes the closing from the point of view of the buyer and the point of view of the salesman. An easy-to-read book filled with many tips.

**MEN AND VOLTS.** By John Winthrop Hammond. J. B. Lippincott Company, New York, 1941. 436 pages. \$2.50. This is the story of the origin and

first 30-odd years of the General Electric Company. Any executive who likes to read business history, and especially those identified with the electrical field will find it of absorbing interest.

**TELEPHONE SELLING.** Edited by Norris A. Brisco. Prentice-Hall, Inc., New York, 1940. 351 pages. \$3.75. A study of the fundamental principles underlying selling merchandise or services by telephone. Presents actual problems that must be met by salespeople and store executives in order to sell merchandise by telephone successfully. The contents are based on the findings of an intensive survey on telephone selling made by a group of specialists in the telephone industry.

**METHODS OF SALES PROMOTION.** By Kenneth S. Howard. McGraw-Hill Book Company, Inc., New York, 1940. 273 pages. \$2.25. Hundreds of sales promotional schemes for the executive who wants a broad picture of the various forms of promotional activity which might be used to advantage in his particular business; and for the sales and advertising man who wants suggestions he can put to profitable use. The book deals separately with the needs of the manufacturer and the retailer, and includes discussion of such media as institutional advertising, house organs and the radio.

**THE LABOUR SITUATION IN GREAT BRITAIN.** International Labor Office, Washington, D. C., 1941. 56 pages. 25 cents. Presents a general picture of the manner in which Great Britain adapted its administrative machinery and its labor and social policies and practices to the needs of total war during the period May-October, 1940.

**ELEMENTS OF ACCOUNTING.** By Raymond W. Coleman. McGraw-Hill Book Company, Inc., New York, 1941. 294 pages. \$3.00. Designed for a short college course in accounting, this book correlates text, problems and questions to stress fundamental accounting ideas. While emphasis is placed upon the uses and interpretation of accounting data, attention is also given to the methods whereby these data are placed on the record.

**HOUSING FOR DEFENSE.** The Twentieth Century Fund, New York, 1940. 198 pages. \$1.50. This report analyzes the basic elements of a national housing policy to meet the needs created by America's armament program. The conclusion is reached that private industry has the capacity to provide the major part of the housing needs of our defense program, but that an immediate plan of action is necessary if we are to avoid the delays and mistakes that crippled America's war effort in 1917-1918. Such a program for action is presented here by the Housing Committee of The Twentieth Century Fund.

**PUBLIC UTILITY ECONOMICS.** By C. Woody Thompson and Wendell R. Smith. McGraw-Hill Book Company, Inc., New York, 1941. 727 pages. \$4.50. Designed as a text for advanced students in economics and commerce, this book relates the field of public utilities to the broader area of economics of which it is a part. Thus the book seeks to acquaint the student with the place which the public utilities occupy within our economic structure, and with the special problems of price control, service supervision, security regulation, etc.

**PUBLIC MANAGEMENT IN THE NEW DEMOCRACY.** Edited by Fritz Morstein Marx, Enno Hobbing and Laurence Radway. Harper & Brothers, New York, 1940. 266 pages. \$3.00. In this book fifteen prominent figures in strategic branches of public service or related fields offer specific suggestions on how to bring new efficiency and leadership to the job of public administration. The volume is an outgrowth of a conference sponsored by the *Harvard Guardian* on the American Public Service. Contributors include Max Lerner, Harry A. Hopf, Samuel H. Ordway, Jr., and Jacob Baker.